Perinatal Substance Use road map

Minnesota Hospital Association

MHA's roadmaps provide hospitals and health systems with evidence-based recommendations and standards for the development of topic-specific prevention and quality improvement programs, and are intended to align process improvements with outcome data. Road maps reflect published literature and guidance from relevant professional organizations and regulatory agencies, as well as identified proven practices. MHA quality and patient safety committees provide expert guidance and oversight to the various road maps.

Each road map is tiered into fundamental and advanced strategies:
- **Fundamental strategies** should be prioritized for implementation, and generally have a strong evidence base in published literature in addition to being supported by multiple professional bodies and regulatory agencies.
- **Advanced strategies** should be considered in addition to fundamental strategies when there is evidence the fundamental strategies are being implemented and adhered to consistently and there is evidence that rates are not decreasing and/or the pathogenesis (morbidity/mortality among patients) has changed.

Operational definitions are included to assist facility teams with road map auditing and identifying whether current work meets the intention behind each road map element.

Resources linked within the road map include journal articles, expert recommendations, electronic order sets and other pertinent tools which organizations need to assist in implementation of best practices.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Collaboration & partnership	**FUNDAMENTAL** *(check each box if "yes")* ☐ The facility has convened an internal multidisciplinary workgroup to address maternal and neonatal concerns related to substance use disorder and prenatal substance exposure. - When beginning this work a multidisciplinary team meets at least quarterly and then as needed once a team has been identified and practices are established. - Multidisciplinary team members may include but are not limited to: representatives from labor and delivery, postpartum, and pediatric units (including NICU or special care nurseries); social workers; pediatricians/any pediatric provider; neonatologists; any OB provider with hospital privileges; advanced practice providers; nursing; home care; case management; quality/patient safety; patient communication/education; risk management and legal department; treatment programs; EPIC/IT teams; lab; pharmacy; lactation; OT/PT and speech; and developmental care.	• A coordinated, multi-system approach and advanced planning for service implementation are critical to optimizing care of pregnant women/persons with substance use disorders and their infants. The Substance Abuse and Mental Health Services Administration (SAMHSA)'s publication, [A Collaborative Approach to the Treatment of Pregnant Women with Opioid Use Disorders: Practice and Policy Considerations for Child Welfare, Collaborating Medical, and Services Providers](#) serves as a guide to developing community partnerships in addressing the needs of pregnant women/persons with opioid use disorders. The publication presents a framework for community organizing, a collaborative practice guide, and includes a case study describing one community's implementation experience.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Collaboration & partnership, continued	☐ The facility has a process in place for regular communication with key community stakeholders.
	  - The benefit of establishing contacts in the community is to create a baseline of understanding around issues such as opportunities for partnership, standard processes for referral/intake, and requirements for the development of the plan of safe care.
	  - Key stakeholders may include, but are not limited to: regular transfer partners, especially for regional hubs that receive neonatal transfers for NAS treatment; Indian Health Services; tribal and/or county public health; local judicial system expectations, child/family services including voluntary county programs (i.e., Mother's First and Project Child); child welfare agencies; judges; county attorneys; local methadone/buprenorphine treatment programs; and law enforcement.
	☐ The facility has a standardized process to obtain a release of information (ROI) allowing for discussion and exchange of health information, related to both substance use disorder treatment and pregnancy care, between relevant treatment team partners (SAMHSA, 2018).
	  - A release (consent) form is readily available for use to facilitate information sharing early in the care process. Ideally, the release is obtained in the outpatient setting to be used throughout the perinatal period, but also available during inpatient care.
	  - As a part of the standardized process, the facility will reach out to identified treatment partners that the patient has identified as appropriate for release.
	☐ The facility has developed systems to support information sharing, including patient tracking and communication between providers across the continuum of care.
	  - Information sharing tools are designed to support care teams, inpatient-outpatient transfers, and cross-departmental handoffs. Strategies may include EHR tools/alerts to flag patient or prenatal level records, shared patient education resources, etc.
	  - Documentation of a plan of safe care is included in information sharing systems and can be updated as circumstances change.
		• Examples of local and national partnerships to support the care of pregnant women/persons with substance use disorder:
		  - First Steps to Healthy Babies - Bemidji
		  - HealthPartners – Healthy Beginnings
		  - Project CHILD - Hennepin County
		  - Project Respect - Boston Medical Center
		  - Ohio Maternal Opiate Medical Supports (MOMS)
		
		• Gaining consent for information sharing between members of the care team for patients with diagnosed substance use disorder with a referral to or current enrollment in a treatment program is essential to support care coordination. The privacy and confidentiality of substance use treatment records are protected by federal rule 42 CFR Part 2. The American Society of Addiction Medicine developed a sample consent form containing data elements required under federal law.
		
		• SAMHSA developed a frequently asked questions guide to assist medical professionals in understanding issues of confidentiality, including signed informed consent forms.
		  - SAMHSA Substance Abuse Confidentiality Regulations
		
		• Through proactive collaboration with local law enforcement, child protective services, and social work, Sanford Health developed a patient pamphlet describing the protective hold placement process.
		  - Sanford Health 'Understanding a 72-hour hold' patient education pamphlet

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Collaboration & partnership, continued	☐ The facility has a process in place for the transfer of a pregnant woman and/or newborn affected by substance use disorder or prenatal substance exposure in the event the case requires a higher level of care beyond what is available at the current location. **ADVANCED** *(check each box if "yes")* ☐ The facility proactively collaborates with local law enforcement, child welfare services, and social work regarding the child protective hold placement protocol.	

Antepartum Care	Ideally, the identified elements of antepartum care are conducted in a prenatal clinic setting. Given that prenatal clinics are not universally incorporated into larger health systems, this section identifies processes for patients who come to the hospital who are not yet in labor.
	
	FUNDAMENTAL
	(check each box if "yes")
	
	☐ The facility has implemented a universal verbal/written screening (risk assessment) process to identify women/persons who are at risk of substance use disorders (ACOG, 2015; ACOG, 2017; SAMHSA, 2018; Wright et al., 2016). Women/persons are also identified for prescription of chronic medications that may impact neonatal outcomes (e.g. chronic opioid prescription).
	- Hospital teams engage with clinics and other referral partners to ensure implementation of a universal screening process at the initial prenatal visit.
	- Screening is conducted at minimum during the initial prenatal visit, for obstetric triage encounters (excluding the emergency department), and upon admission to the hospital.
	- Universal screening is conducted with a validated tool which may include verbal or written questions pertaining to past and current substance use.
	- The verbal/written screening process clearly identifies indications for conducting a preliminary urine drug screening and additional confirmatory drug testing when indicated.
		• The American College of Obstetricians and Gynecologists has issued committee opinions outlining the importance of universal screening for substance use disorder.
		  - ACOG Committee Opinion #633 addresses alcohol abuse and other substance use disorders, proposing an ethical framework for incorporating substance use disorder screening into obstetric and gynecologic practice.
		  - ACOG Committee Opinion #711 outlines recommendations and conclusions around opioid use and opioid use disorder in pregnancy, including early universal screening.
		
		• The National Alliance of Advocates for Buprenorphine Treatment developed a language guide which makes recommendations of suggested alternative terminology to reduce stigma when addressing addiction.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Antepartum Care, continued	- The screening/risk assessment process, toxicology testing indications, and what happens as the result of a positive screen/ risk assessment are discussed with patients and documented in the medical record. This conversation is an important step in fostering an environment of transparency and laying a foundation for patient-provider trust. Consider developing a standard methodology or script (e.g., SBIRT) to reduce potential for variance.
	- The process outlines follow up actions taken in the event of a positive screen, including a social work assessment, chemical use (Rule 25) assessment, referral to appropriate treatment, and connection to available community resources.
	
	☐ The facility has developed and implemented a policy pertaining to the identification, testing, and reporting of patients with substance use disorder and/or prescription of chronic medications that may impact neonatal outcomes (i.e. chronic opioid prescription).
	- Each institution must customize its approach based on patient characteristics and needs, staff considerations, and legal analysis of current state statutes.
	- The policy outlines indications for preliminary urine drug screening and additional confirmatory drug testing.
	- The policy addresses patient communication regarding maternal and neonatal screening/risk assessment and toxicology testing in alignment with applicable state statutes. This communication is a critical step in fostering an environment of transparency and laying a foundation for patient-provider trust. Conversations around toxicology testing should also address what happens as a result of a positive toxicology result by substance (e.g., THC, opioids, alcohol) in alignment with state statutes and mandatory reporting requirements.
	- The policy outlines next steps upon receipt of a positive toxicology result, including a review of facility-administered medications that may have impacted results, documentation in the medical records, reporting in accordance with state statute, follow-up notification to the prenatal provider/clinic for emergency department or triage encounters that do not result in a live birth, chemical use (Rule 25) assessment, collection of a substance use history (SAMHSA, 2018), screening for other risk factors (e.g., psychological health, intimate partner violence), referral to appropriate treatment, and connection to available community resources.
		• The Council on Patient Safety in Women's Health Care Safety Action Series webinar, Recognizing Opioid Use Disorder During Pregnancy: Effective Screening Methods for OUD and its Co-Morbidities (links to the slides and recording available on the event web page) describes the Screening, Brief Intervention, and Referral to Treatment (SBIRT) methodology to incorporate universal screening, shares several validated screening instruments, and offers examples of scripting and documentation to support the screening process.
		
		• SAMHSA's Decisions in Recovery: Treatment for Opioid Use Disorder handbook serves as a resource to people living with opioid use disorder, offering information about medication-assisted treatment options and tools to facilitate discussions with a health care provider.
		
		• SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants Guide provides examples of validated screening instruments to detect substance use in pregnant women/ persons. Additional sample screening tools:
		  - HealthPartners Healthy Beginnings Questionnaire
		  - MHA Neonatal Abstinence Syndrome Toolkit, Appendix A
		  - 4P's Plus
		  - National Institute on Drug Abuse - Drug Screening Tool
		
		• Rule 25 assessments support the determination of appropriate treatment for chemical use and are required to receive public funding for chemical dependency treatment.
		  - Minnesota Department of Human Services Rule 25 assessment standard form
		  - Minnesota Rule 25 Referral Numbers by county, tribe

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Antepartum Care, continued	☐ The facility has a process for patients receiving medically indicated substances that may affect neonatal outcomes.
	
	☐ The facility has a process or protocol in place to support administration of opioid replacement medication for acute withdrawal while arranging for referral to opioid use disorder treatment that aligns with the "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b).
	  - A similar process is defined for patients who present in labor and exhibit substance withdrawal symptoms.
	  - Providers are educated on specific clinical scenarios in which this initial treatment might be prolonged for longer than 3 days (see CFR 42 – if a patient is admitted for another reason – preterm labor, PPROM, and they need to stay in the hospital for that, and have opioid withdrawal as a secondary but not admitting diagnosis.
	
	☐ The facility has a policy that defines opioid prescribing practices and participation in the prescription drug monitoring program.
	  - The policy follows the Minnesota Department of Human Services opioid prescribing guidelines and the Centers for Disease Control Guideline for Prescribing Opioids for Chronic Pain.
	
	☐ The facility's medical record is designed to capture sufficient details regarding prenatal care to support care throughout the perinatal period.
	  - Includes: plan of safe care, birth plan, care coordination notes, medication dose during prenatal care (for patients in a MAT treatment program), plan for medication decrease postpartum (if any), and contact information for the appropriate treatment center (where applicable).
	
	☐ Pregnant persons with identified substance use disorder or prescribed chronic medications that may impact neonatal outcomes are offered education that address their specific needs.
	  - Education is tailored to patient circumstances, including but not limited to: patients with unknown substance use status, patients with newly identified substance use disorder, patients in a medication-assisted treatment program, and patients currently receiving opioids for a medical indication.
		• SAMHSA operates several national service directories to support health care professionals in locating appropriate referrals for patients with identified substance use disorder:
		  - Behavioral Health Treatment Services Locator
		  - Opioid Treatment Program Directory
		  - Buprenorphine Physician & Treatment Program Locator
		
		• The American Society of Addiction Medicine's National Practice Guideline for the Use of Medications in the Treatment of Addiction Involving Opioid Use provides guidance to clinicians on evaluation and treatment planning for patients with identified opioid use disorder.
		
		• The MHA NAS toolkit includes a sample policy addressing screening, identification, and treatment procedures. Each institution must customize their approach based on patient characteristics and needs, staff considerations and legal analysis of current state statutes.
		
		• Additional NAS policy examples:
		  - Fairview Health Services NAS Policy
		  - Sanford Bemidji Medical Center Substance Abuse Policy
		
		• The "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b) addresses the parameters within which a prescriber may administer opioid medication for acute withdrawal while arranging for referral to opioid use disorder treatment.
		
		• The Minnesota Prescription Drug Monitoring Program is a tool to support patient care management through tracking of prescription data. The program was implemented to help detect diversion, abuse and/or misuse of prescriptions for controlled substances.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Antepartum Care, continued	- Topics of discussion include, but are not limited to: basic information on potential legal, social, and medical impacts of treatment options, discussion of risks for infants exposed to licit and illicit substances in utero and the effects of substances on the neonate (Krans, Cochran, & Bogen, 2015; SAMHSA, 2018), preparation for the intrapartum period, setting expectations around neonatal testing in the hospital, pain management options/planning, expectations for the hospital stay (minimum length of stay), postpartum contraception intention/ planning, newborn care, breastfeeding, signs and symptoms of NAS, caring for infants with NAS, postpartum care including medication management and discharge plans.
	- Care team members responsible for providing education exercise sensitivity to language and literacy barriers and practice the concept of cultural humility in patient interactions.
	☐ The facility has a mechanism for handling failed appointments.
	- Patient care recovery strategies are designed with consideration of the impact of social determinants of health and resource availability.
	- The mechanism incorporates communication between primary prenatal care provider/facility and key care partners including, but not limited to: treatment programs, social work, case management, and patient advocates.
	
	ADVANCED
	(check each box if "yes")
	☐ The facility has designated individuals following the care of mothers/ persons affected by substance use disorder and/or patients receiving medically indicated substances that may affect neonatal outcomes.
	- Facilities should consider operational impacts and determine whether there are sufficient staff available (e.g., social workers, care coordinators) to meet with patients across the continuum.
	- Community programs such as family home visiting, nurse family partnerships, and local or tribal public health may support care coordination and provision of wraparound services.
		• National and state guidelines provide a framework for opioid prescribing to support pain management.
		  - Minnesota Opioid Prescribing Guidelines
		  - CDC Guideline for Prescribing Opioids for Chronic Pain
		
		• Prenatal patient education and support for mothers at risk of delivering an infant with symptoms of NAS is a critical step in preparation for birth and newborn care. A variety of sample educational materials are available from local and national healthcare organizations:
		  - Children's Minnesota – Opiate Use During Pregnancy
		  - Providers Clinical Support System - Pregnancy: Methadone and Buprenorphine
		  - Providers Clinical Support System - Childbirth, Breastfeeding and Infant Care: Methadone and Buprenorphine
		  - Fairview Health Services – Marijuana & Pregnancy
		  - Mayo Clinic - NAS: Understanding Your Baby's Withdrawal
		  - Mayo Clinic – Planning for Helping Your Baby Withdraw from Drugs
		
		• Care coordination and the provision of wraparound services for pregnant women/persons affected by substance use disorder supports safer and more effective care. Local and national program examples:
		  - HealthPartners Healthy Beginnings
		  - Superior Babies
		  - Nurse-Family Partnership program overview; Minnesota program contacts
		  - Project CHILD
		  - Project Embrace - Southern New Jersey Perinatal Cooperative
		  - Dartmouth-Hitchcock Moms in Recovery

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Antepartum Care, continued	☐ The facility has a process to collaborate with county social work to develop a plan of safe care for mothers/persons with identified substance use disorder.
	  - Responsibility for the plan of safe care is ultimately held at the county level, however the care team may provide important contributions to plan development, implementation, and monitoring.
	  - The plan of safe care is a comprehensive case plan developed by a multidisciplinary team which addresses the needs of infants and parents, including the health and substance use disorder treatment needs of and affected family or caregivers.
		• Federal law requires that all infants determined to be affected by maternal substance abuse must have a plan of safe care in place on discharge from the birth hospital, as outlined in the Child Abuse Prevention and Treatment Act (CAPTA) Reauthorization Act of 2010 and the Comprehensive Addiction and Recovery Act (CARA) of 2016.
		
		• The Minnesota Department of Human Services' Best Practice Guide for Responding to Prenatal Exposure to Substance Use describes the plan of safe care, outlines requirements on when a plan must be developed, and lists safety factors and topics to be addressed as part of the plan. The plan of safe care section begins on page 11 of the document.

Intrapartum care	**FUNDAMENTAL** *(check each box if "yes")* ☐ The facility has a process in place to administer opioid medication for acute withdrawal while arranging for referral to opioid use disorder treatment that aligns with the "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b). ☐ The facility has a process in place for establishing medication dose for patients currently in a treatment program. - Ideally, the medication dose is established during the prenatal period to support maintenance therapy during labor and delivery. However, facilities should establish lines of communication with treatment programs (e.g., phone numbers to use based on clinic hours, plans for contact in emergent situations or during clinic off-hours) to ensure dose can be established in a timely manner in the event it is otherwise unknown. ☐ The facility has a process in place to develop and document a pain management/anesthesia plan early in the intrapartum period for mothers/persons with known substance use disorder and/or mothers/persons receiving medically indicated substances that may affect neonatal outcomes (SAMHSA, 2018).	• The "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b) addresses the parameters within which a prescriber may administer opioid medication for acute withdrawal while arranging for referral to opioid use disorder treatment. • The Northern New England Perinatal Quality Improvement Network's Toolkit for the Perinatal Care of Women with Opioid Use Disorders outlines intrapartum pain management considerations and literature (see page 8). • SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants addresses pain relief in the peripartum period (see section 1 fact sheet #8, Peripartum pain relief beginning on page 58).

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Intrapartum care, continued	- Ideally, pain management options for labor and delivery are discussed prenatally, and the plan is followed during the intrapartum period. In the event a plan does not already exist, a pain management/anesthesia consultation is ordered early in the intrapartum period. - The facility's pain management/anesthesia plan also identifies providers to be consulted to manage patients in acute opioid withdrawal. ☐ The facility has a process in place to implement appropriate visitor guidelines (e.g., restriction, behavior plans) as needed.	

Postpartum care	**FUNDAMENTAL**
	(check each box if "yes")
	
	☐ The facility has a process in place to administer opioid medication for acute withdrawal while arranging for referral to opioid use disorder treatment that aligns with the "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b).
	☐ The facility has developed a postpartum nursing care model for mothers/persons with known substance use disorder and/or mothers/persons receiving medically indicated substances that may affect neonatal outcomes.
	  - Nursing care is based in the principles of cultural humility, emphasizes compassion, and seeks to support mothers/persons and families to assume newborn care responsibilities as appropriate.
	  - Mothers/persons are monitored postpartum to support adjustments in maintenance therapy doses (SAMHSA, 2018; Krans et al., 2015). For patients in an established treatment program, medication adjustment decisions are mutually agreed upon or communicated in a timely manner.
	  - The nursing care model includes pain management/anesthesia consultation, especially for patients who deliver via cesarean section.
	  - Nursing care includes education on newborn care and parenting strategies, regardless of child welfare hold status. Exceptions may be made as directed by child welfare services.
	  - Consider the use of peer recovery support resources such as certified peer specialists and community health workers.
		• The "3-day rule" federal guideline on emergency narcotic addiction treatment, 21 CFR 1306.07(b) addresses the parameters within which a prescriber may administer opioid medication for acute withdrawal while arranging for referral to opioid use disorder treatment.
		
		• SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants addresses breastfeeding considerations for infants at risk for neonatal abstinence syndrome (see section 2 fact sheet #11, beginning on page 89).
		
		• Multiple professional organizations have developed guidance around breastfeeding for mothers/persons with known substance use disorder and/or mothers/persons receiving medically indicated substances that may affect neonatal outcomes:
		  - Academy of Breastfeeding Medicine Protocol #21: Guidelines for Breastfeeding and Substance Use or Substance Use Disorder
		  - American Academy of Pediatrics Policy Statement: Breastfeeding and the Use of Human Milk
		  - ACOG Committee Opinion #722: Marijuana Use During Pregnancy and Lactation
		  - ACOG Committee Opinion #711: Opioid Use and Opioid Use Disorder in Pregnancy

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Postpartum care, continued	☐ The facility's rooming plan and nursing model prioritize couplet care when appropriate.
	   - Exceptions to couplet care may be made as directed by child welfare services (e.g., 72-hour hold).
	   - Support systems for couplet care considerations like breastfeeding support, skin to skin promotion, and rooming-in (MacMillan et al., 2018) exist across units, including labor and delivery, postpartum, neonatal intensive care, special care nursery, and pediatrics.
	☐ The facility supports and, when appropriate, encourages mothers/persons to breastfeed with substance use disorder who are undergoing treatment, and/or mothers/persons receiving medically indicated substances for other conditions (that might be expected to affect neonatal outcomes, e.g. chronic opioid prescription). (Krans et al., 2015; Reece-Stremtan & Marinelli, 2015; SAMHSA, 2018)
	   - Mothers/persons who are participating in an established methadone or buprenorphine maintenance treatment program are encouraged to breastfeed.
	   - Breastfeeding is avoided for mothers/persons who have contraindications (e.g., human immunodeficiency virus). The decision to breastfeed should be a result of shared decision making between providers and the breastfeeding woman/person. (Eidelman & Schanler, 2012)
	   - Lactation consultation is offered upon initiation of breastfeeding and offered as needed throughout the hospital stay.
	   - Breastfeeding has many benefits. It is important to set expectations with new mothers/persons about the potential difficulties they may experience as they begin to breastfeed. Breastfeeding may initially be difficult, especially for infants exhibiting withdrawal symptoms, though the difficulties may resolve over time.
	   - For mothers/persons who are unable to breastfeed directly, alternatives such as kangaroo care or pumping are promoted.
	☐ The facility has a process in place to develop and document a pain management/anesthesia plan early in the postpartum period for mothers/persons with known substance use disorder and/or mothers/persons receiving chronic prescription opioids for medical indications. (SAMHSA, 2018).
		- ACOG Committee Opinion #633: Alcohol Abuse and Other Substance Use Disorders: Ethical Issues in Obstetric and Gynecologic Practice
		
		● Facility breastfeeding policy example:
		   - Hennepin Healthcare Breastfeeding Policy
		
		● Mother/person-infant interactions are significantly impacted by a mother's/person's ability to understand and respond to her infant. To support their ability to interpret and respond to infant cues, mothers/persons of infants at risk for development of neonatal abstinence syndrome should be educated on nonpharmacologic and pharmacologic approaches, including applicable scoring techniques used to guide infant care. Sample patient education materials are available from local and national organizations:
		   - Sanford Bemidji Medical Center Symptom Diary
		   - Hennepin Healthcare NAS Pamphlet
		   - Ohio Perinatal Quality Collaborative Neonatal Abstinence Syndrome Guide for Families
		   - Northern New England Perinatal Quality Improvement Network NAS Toolkit (Examples of patient resources begin on page 95)
		
		● MHA's Controlled Substance Diversion road map and toolkit outline a set of best practices and resources to enhance security for controlled substances, including narcotics and other powerful prescription medications.
		
		● SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants addresses pain relief in the peripartum period (see section 1 fact sheet #8, Peripartum pain relief beginning on page 58).

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Postpartum care, continued	- Ideally, pain management/anesthesia options are discussed prenatally. In the event a plan does not already exist, a pain management consultation is ordered early in the intrapartum period. - Patients are made aware that pain medications are not withheld for post-surgical pain relief based solely on substance use history. - The facility's pain management/anesthesia plan identifies providers to be consulted to manage patients in acute withdrawal. ☐ The facility has a process to engage mothers/persons in the ongoing evaluation of infants at risk for developing symptoms of NAS (SAMHSA, 2018). - Development of a standard teaching guide or method for use by unit staff may reduce potential for variability in education provided to caregivers. ☐ The facility has developed, implemented and educated staff on the controlled substance diversion policy. ☐ The facility has developed a process to follow up on positive maternal and neonatal toxicology screens and confirmatory testing results received after patient discharge. - Patients are informed about the follow up process for positive toxicology results. - As part of the process, the facility reviews and notes any medications given during the inpatient stay that may influence toxicology results (e.g., for medications purposefully administered during labor and delivery which may result in a positive test result but are not a product of non-prescribed substance use disorder). - The process includes notification of child and family services in accordance with state statute. (Minnesota Statutes, 2021)	
Neonatal care & NAS treatment	**FUNDAMENTAL** *(check each box if "yes")* ☐ The facility's rooming plan and nursing model prioritize couplet care, with special consideration for infants requiring higher levels of care in specialized units (e.g., special care nursery, neonatal intensive care unit) and neonatal patient transfers.	• Neonatal assessment and treatment protocols should be developed based on a thorough evaluation of benefits and drawbacks such as timeliness of results, screening vs. confirmatory methods, and ability to identify potential withdrawal sources. SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants addresses screening,

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Neonatal care & NAS treatment, continued	☐ The facility has developed a standardized protocol for neonatal toxicology screening. (Minnesota Statutes, 2021)
	  - The protocol identifies triggers for neonatal toxicology screening in conjunction with maternal toxicology screening results and/or maternal indications. (Minnesota Statutes, 2021)
	  - The policy addresses parental communication procedures and reporting in accordance with state statute.
	☐ The facility has developed and implemented a standardized NAS assessment and treatment protocol for infants with prenatal substance exposure (Hudak & Tan, 2012; Kocherlakota, 2014).
	  - The process utilizes a formal assessment or scoring system, and staff are trained in correct use of the selected assessment/tool.
	  - Development of scoring guidelines may support improved inter-rater reliability.
	  - The protocol addresses the care model for newborns who are identified as at-risk for NAS but do not score/assess at a level that necessitates treatment of NAS.
	  - The protocol describes both non-pharmacologic and pharmacologic treatment approaches (e.g., through development of a treatment algorithm) and indicators for initiation, monitoring, and discontinuation of treatment.
	  - The protocol includes a clear handoff procedure for neonates requiring transfer to another facility for pharmacologic treatment. Caregiver needs, such as transportation, are addressed in collaboration with care coordination/social work.
	☐ The facility has a process to engage caregivers (e.g., parents, mothers, fathers, grandparents, foster parents, etc.) in educational opportunities focused on newborn care and parenting strategies.
	  - Ongoing evaluation ("scoring") of infants at risk for developing symptoms of NAS is included as applicable.
	  - Development of a standard teaching guide or method for use by unit staff may support standardization of education provided to caregivers.
	☐ The facility has a process in place to implement appropriate visitor guidelines (e.g., restriction, behavior plans) as needed.
	☐ The facility has developed a process to follow up on positive neonatal toxicology screening received after patient discharge.
		assessment, and management of NAS (see section 2 fact sheets 9 & 10 beginning on page 78). The SAMHSA guide includes example NAS scoring scales (page 79) and a table comparing the benefits and drawbacks of common toxicology screening methods (pages 81 - 83).
		
		• Additional resources to support NAS treatment standardization:
		  - MHA NAS Toolkit (includes a comparison of neonate assessment tools, treatment options, example algorithm, and sample policy)
		  - Fairview Health Services NAS policy & algorithms for care of couplet with suspected or known risk factors for NAS
		  - Specimen Collection: Meconium for Detection of Fetal Drug Exposure: Mayo Clinic – Rochester
		  - Mayo Clinic – NAS Pharmacologic Management Algorithm & Maternal Breast Milk and Illicit or Illegal Drug Use Guideline
		  - St. Cloud Hospital - NAS Policy
		  - St. Cloud Hospital – NAS Treatment Algorithm
		  - Ohio Perinatal Quality Collaborative Finnegan Neonatal Abstinence Scoring Tool and Inter-Rater Reliability Scoring Sheet
		
		• Mother/person-infant interactions are significantly impacted by a mother's/person's ability to understand and respond to her infant. To support their ability to interpret and respond to infant cues, mothers/persons of infants at risk for development of neonatal abstinence syndrome should be educated on nonpharmacologic and pharmacologic approaches, including applicable scoring techniques used to guide infant care. Examples of patient engagement materials addressing NAS scoring and treatment:
		  - Children's Minnesota – Neonatal Abstinence Syndrome patient education
		  - Sanford Bemidji Medical Center Symptom Diary

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Neonatal care & NAS treatment, continued	- Infants' caregivers are informed about the follow up process for positive toxicology screening. - The process includes notification of child welfare services in accordance with state statute. - The process identifies communication pathways to notify pediatricians, advanced practice and/or primary care providers for follow up.	- Ohio Perinatal Quality Collaborative Neonatal Abstinence Syndrome Guide for Families - Northern New England Perinatal Quality Improvement Network NAS Toolkit (Examples of patient resources begin on page 107)

Discharge planning	**FUNDAMENTAL**
	(check each box if "yes")
	
	☐ The facility has a process for social work assessment and potential discharge to a treatment program for mothers/persons (if indicated).
	☐ The facility has a standard process to screen new mothers/persons with known or newly identified substance use disorder for mental health disorders prior to discharge from the hospital (ACOG, 2017).
	☐ The facility has a process in place to offer non-coercive counseling regarding available contraceptive options or referral for counseling either during hospitalization or at the time of discharge (ACOG, 2017; SAMHSA, 2018).
	  - Mothers/persons may have the ability to leave the hospital with a contraceptive prescription, supplies, referral or a contraception plan if desired.
	☐ The facility has a standard process to plan for maternal medication management prior to discharge in concert with treatment partners.
	  - The standard process includes notification to treatment program partners (e.g., methadone and buprenorphine treatment programs) that the patient has delivered (if ROI obtained).
	  - Changes to medication dosage are made in conjunction with the full treatment team.
	  - A safety plan for the mother/person and family is in place prior to beginning any potential medication tapering.
	☐ The facility has a standard process to develop a comprehensive written discharge plan addressing the specific needs of mothers/persons with known substance use history and infants with prenatal substance exposure (SAMHSA, 2018).
	  - The discharge planning process is patient-centered, actively engaging mothers/persons and family caregivers in the identification of needs and resources, and planning for the discharge.
		• Rule 25 assessments support the determination of appropriate treatment for chemical use and are required to receive public funding for chemical dependency treatment.
		  - Minnesota Department of Human Services Rule 25 assessment standard form
		  - Minnesota Rule 25 Referral Numbers by county, tribe
		
		• Federal law requires all infants determined to be affected by maternal substance abuse must have a plan of safe care in place on discharge from the birth hospital, as outlined in the Child Abuse Prevention and Treatment Act (CAPTA) Reauthorization Act of 2010 and the Comprehensive Addiction and Recovery Act (CARA) of 2016.
		
		• The Minnesota Department of Human Services' Best Practice Guide for Responding to Prenatal Exposure to Substance Use describes the plan of safe care, outlines requirements on when a plan must be developed, and lists safety factors and topics to be addressed as part of the plan. The plan of safe care section begins on page 11 of the document.
		
		• Postpartum contraception is an important topic to discuss with new mothers/persons following birth of an infant with neonatal abstinence syndrome. Long acting reversible contraception (LARC), such as intrauterine devices or implants, have demonstrated greater continuation rates in the postpartum period compared to short term or daily contraceptive options (ACOG, 2017). ACOG has published several committee opinions and resources regarding increased access to postpartum LARC.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Discharge planning, continued	- Comprehensive discharge plans include consultations with home nursing and social work to address medication management, nutritional needs, family and social support, transportation, health literacy, and identification of post-discharge resources. - The discharge planning process includes scheduling follow up appointments for both the mother/person and infant prior to leaving the hospital. - The discharge plan identifies community resources to support long-term recovery needs such as engagement with peer counselors, recovery coaches, and certified peer specialists. - For infants discharged while still being managed pharmacologically for NAS, the discharge notes provide specific guidance on a care plan and the weaning process. - The discharge plan includes acute withdrawal resources and referrals to providers knowledgeable about NAS in the event an infant experiences withdrawal symptoms post-discharge. - The discharge plan addresses follow up on test and studies for which confirmed results are not available at the time of discharge. ☐ The facility has a standard process for handing off mother/person/infant dyads and NAS cases to community providers, local public health, advanced practice providers, hospital-based pediatricians and/or family practice physicians. - The process includes provision of a complete discharge summary to all involved care providers for both the mother/person and infant. - Handoffs which include a direct phone call to providers offer an opportunity to provide deeper context to discharge notes. In addition, postpartum women with opioid use disorder should receive overdose training and preferably, co-prescribing of naloxone for overdose prevention. (ACOG, 2017)	- ACOG committee opinions and resources on LARC • HealthLeads' social needs screening toolkit includes best practices, sample tools, and a clinically-validated and patient-centered set of questions at a range of patient literacy levels to support care teams in identifying unmet social needs prior to discharge. • SAMHSA's Clinical Guidance for Treating Pregnant and Parenting Women with Opioid Use Disorder and Their Infants addresses infant discharge planning (see section 2 fact sheet #12, Infant discharge planning beginning on page 93) and maternal discharge planning (see section 3 fact sheet #15, maternal discharge planning beginning on page 115). The infant fact sheet presents a discharge checklist and best practices for follow-up, and the maternal fact sheet addresses pharmacotherapy considerations, contraception, comorbid mental disorders, and compatibility with the plan of safe care. • The American Academy of Pediatrics 2016 policy statement of safe sleep practices (AAP, 2016) makes recommendations for a safe infant sleeping environment. The Safe to Sleep public education campaign has a variety of campaign materials, including a Safe to Sleep patient education flyer which promote safe sleep messages to multiple audiences. Additionally, the Minnesota Department of Health's safe sleep resource page shares educational materials, data, and regulations related to safe sleep.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Discharge planning, continued	**ADVANCED**
	(check each box if "yes")
	
	☐ The facility has a process to ensure a plan of safe care has been developed and documented for the mother/person/infant dyad prior to discharge.
	   - The plan of safe care is documented in both the maternal and neonatal record and can be updated as circumstances change during the pregnancy.
	   - If a plan of safe care was developed for a mother/person prior to delivery, the plan should be updated to incorporate considerations for the infant.
		• Community-based resources and providers should be engaged to provide support to mothers/persons, caregivers, and infants after discharge. Examples of local community organizations supporting mothers/persons and infants affected by substance abuse disorder and/or NAS:
		   - Journey Home – CentraCare Health
		   - C.R.A.F.T. Project - Olmsted County
		   - Minnesota Nurse-Family Partnership Programs
		   - Superior Babies Program
		   - Help Me Grow
		   - Minnesota Family Home Visiting Program

Performance improvement monitoring	**FUNDAMENTAL**
	(check each box if "yes")
	
	☐ The facility collects data on and reviews the number of pregnant women/persons admitted to the hospital who undergo verbal or written screening protocol.
	   - When this metric is not at 100%, it indicates the potential for non-uniformity and/or potential bias in maternal screening practices.
	
	ADVANCED
	(check each box if "yes")
	
	☐ The facility collects data on and reviews length of stay for infants treated for NAS.
	☐ The facility has a process to review NAS rates, comparing cases coded for exposure and those coded for treatment.
	   - Baseline data on NAS rates can create a clearer picture of the scope of occurrence in a facility. This metric supports the facility team in understanding where variance in coding practice is occurring. This data may be useful to help documentation practices and can inform where further staff engagement and education is needed.
	☐ The facility collects data on and reviews the number of mothers/persons/ infants with known substance use disorders and/or exposure for whom a plan of safe care has been documented in the health record.	

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:

Performance improvement monitoring, continued	- When this metric is not at 100%, it indicates the potential for non-uniformity of care. This metric is also an indicator of engagement and connection to social work partners.
	☐ The facility has a process to note deviations from provision of couplet care along with associated rationale.
	  - Couplet care considerations include breastfeeding support (e.g., access to a lactation consultation, private space to breastfeed), skin to skin promotion, and rooming-in. Support systems for couplet care are evaluated across units including labor and delivery, postpartum, neonatal intensive care, special care nursery, and pediatrics.
	  - Reviewing atypical practice and associated rationale supports identification of any persistent systemic issues which may contribute to variation in the provision care.
	☐ The facility collects data on and reviews breastfeeding initiation and duration during the baby's hospital stay among mother/person/infant dyads affected by substance use disorders.
	  - Breastfeeding is one indicator of couplet care provision. Declines in breastfeeding initiation and continuation rates among mothers/persons affected by substance use disorder may indicate opportunities to provide further support.
	☐ The facility collects data on and reviews the number of infants at known risk for development of NAS for which ongoing assessment (i.e., Finnegan scoring, ESC, etc.) is conducted.
	  - When this metric is not at 100%, it indicates variance and a potential for bias in neonatal care practices.
	☐ The facility collects data on and reviews the number of infants treated pharmacologically for NAS.
	  - This metric is applicable for sites who can provide pharmacologic treatment in-house. Facilities that transfer out pharmacologically treated infants may consider altering this metric to track the number of neonate transfers due to a need for pharmacologic treatment.
	  - This internal measure supports evaluation of practice changes within an institution regarding the nonpharmacologic and pharmacologic care provided.	

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Performance improvement monitoring, continued	☐ The facility collects data on and reviews the percent of infants treated for NAS whose mothers/persons were already in a substance use treatment program (mothers/persons receiving MAT). – This metric provides insight on whether antepartum screening and referral processes are working effectively	

Education of the health care team	**FUNDAMENTAL**
	(check each box if "yes")
	
	☐ The facility has a process to provide education on substance use disorders and neonatal abstinence syndrome at new staff orientation.
	    – Education includes but is not limited to the science of addiction and substance use disorder and specific facility policies related to maternal SUD and NAS including maternal and neonatal screening/testing practices, reporting requirements, plan of safe care development, nursing care model for providing couplet care, and standardized NAS screening and treatment protocols.
	    – Psychosocial adaptation topics including social determinants of health (Ades, Goddard, Pearson Ayala, Chemouni Bach, & Wu, 2018), trauma-informed care, the practice of empathy and refraining from judgment, effective communication strategies for building trust and engaging mothers/persons affected by SUD, and the practice of exercising cultural humility are emphasized throughout education.
	    – Education is provided to team members from all disciplines and roles (e.g., residents, physicians, nursing staff, advanced practice providers, medical & nursing students) across the perinatal care continuum, including antepartum, labor and delivery, postpartum, neonatal intensive care unit, specialty care nursery, and pediatric units.
	☐ The facility has a process to provide staff education on substance use disorders and neonatal abstinence syndrome annually or per local credentialing requirements.
		• Alberta Family Wellness Initiative offers resources and training describing the brain science behind addiction. The initiative's brain story toolkit includes a free Brain Story Certification course and other multimedia that explore the science of early brain development and its connection to adult mental health.
		
		• The Council on Patient Safety in Women's Health Care presented a Safety Action Series webinar, "Challenging Unconscious Biases, Improving Women's Health Outcomes," which defines unconscious bias and introduces analysis of racial inequities in the medical setting to increase awareness and understanding of institutional and structural racism as underlying causes of health disparities.
		
		• The National Center for Trauma-Informed Care (NCTIC) provides consultation, technical assistance, and educational resources on the trauma-informed approach, which reflects six key principles: safety; trustworthiness and transparency; peer support; collaboration and mutuality; empowerment, voice and choice; cultural, historical, and gender issues.

Road map sections	Road map questions (if not present at your hospital or answering no, please see next column for suggested resources)	If specific road map element is missing, consider the following resources:
Education of the health care team, continued	- Education includes but is not limited to the science of addiction and substance use disorder and specific facility policies related to maternal SUD and NAS including maternal and neonatal screening/testing practices, reporting requirements, plan of safe care development, nursing care model for providing couplet care, and standardized NAS screening and treatment protocols. - Psychosocial adaptation topics including social determinants of health (Ades et al., 2018), trauma-informed care, the practice of empathy and refraining from judgment, effective communication strategies for building trust and engaging mothers/persons affected by SUD, and the practice of exercising cultural humility are emphasized throughout education. - Education is provided to team members from all disciplines and roles (e.g., residents, physicians, nursing staff, advanced practice providers, medical & nursing students) across the perinatal care continuum, including antepartum, labor and delivery, postpartum, neonatal intensive care unit, specialty care nursery, and pediatric units. **ADVANCED** *(check each box if "yes")* • The facility has a process to provide education on documentation of NAS among providers. - Education focuses on documentation in conjunction with institutional coding and billing.	• The Minnesota Trauma Project houses trauma resources including trainings, events, websites, books, and listings of trauma-informed providers. • The National Alliance of Advocates for Buprenorphine Treatment developed a language guide which makes recommendations of suggested alternative terminology to reduce stigma when addressing addiction. • The Providers Clinical Support System (PCSS) program, funded by SAMHSA, provides education and training for primary care providers with the goal of increasing knowledge and skills in the prevention, identification, and treatment of substance use disorders with a focus on opioid use disorders.

References

1. Ades, V., Goddard, B., Pearson Ayala, S., Chemouni Bach, S., Wu, S.X. Committee on Health Care for Underserved Women, American College of Obstetricians and Gynecologists. (2018). Committee opinion no. 729: Importance of social determinants of health and cultural awareness in the delivery of reproductive health care. American Journal of Obstetrics and Gynecology (131)6, e.43-80. doi:10.1097/AOG.0000000000002660

2. Committee on Obstetric Practice, American College of Obstetricians and Gynecologists. (2017). Committee opinion no. 711: Opioid use and opioid use disorder in pregnancy. American Journal of Obstetrics and Gynecology (130)2, e81-94. doi:10.1097/AOG.0000000000002235

3. Hudak, M.L., Tan, R.C. (2012). Neonatal drug withdrawal. Pediatrics, 129(2), e540-e560. doi:10.1542/peds.2011-3212

4. Kocherlakota, P. (2014). Neonatal abstinence syndrome. Pediatrics, 134(2), e546-e561. doi:10.1542/peds2013-3524

5. Krans, E. E., Cochran, G., & Bogen, D. L. (2015). Caring for opioid dependent pregnant women: prenatal and postpartum care considerations. Clinical Obstetrics and Gynecology, 58(2), 370–379. doi:10.1097/GRF.0000000000000098

6. MacMillan, K. L., Rendon, C. P., Verma, K., Riblet, N., Washer, D. B., Volpe Holmes, A. (2018). Association of rooming-in with outcomes for neonatal abstinence syndrome: a systematic review and meta-analysis. JAMA Pediatrics, 172(4), 345-351. doi:10.1001/jamapediatrics.2017.5195

7. Substance Abuse and Mental Health Services Administration. (2018). Clinical guidance for treating pregnant and parenting women with opioid use disorder and their infants. (HHS publication no. (SMA) 18-5054). Rockville, MD: Substance Abuse and Mental Health Services Administration.

8. Task Force on Sudden Infant Death Syndrome, American Academy of Pediatrics. (2016). SIDS and other sleep-related infant deaths: Updated 2016 recommendations for a safe infant sleeping environment. Pediatrics, 138(5). doi:10.1542/peds.2016-2938

9. Wright, T.E., Terplan, M., Ondersma, S.J., Boyce, C., Yonkers, K., Change, G., Creanga, A.A. (2016). The role of screening, brief intervention, and referral to treatment in the perinatal period. American Journal of Obstetrics and Gynecology, 2015(5), 539-547. doi:10.1016/j.ajog.2016.06.038

10. Minnesota Statutes, Chapter 30--H.F.No. 2128, Sec. 56., section 260E.31, subd.1 amendment (2021) https://www.revisor.mn.gov/laws/2021/0/30/laws.10.56.0#laws.10.56.0

11. Eidelman, A. I., & Schanler, R. J. (2012). Breastfeeding and the use of human milk. Pediatrics.